

Notice of Allowability

Application No.

10/817,235

Examiner

Tina M. Wong

Applicant(s)

BROWN ET AL.

Art Unit

2874

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to a Request for Continued Examination received 15 May 2006.
2. ☒ The allowed claim(s) is/are 2-10 and 12.
3. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some* c) ☐ None of the:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
(a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____.
(b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

- | | |
|---|---|
| 1. <input type="checkbox"/> Notice of References Cited (PTO-892) | 5. <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 2. <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 6. <input type="checkbox"/> Interview Summary (PTO-413),
Paper No./Mail Date _____ |
| 3. <input type="checkbox"/> Information Disclosure Statements (PTO-1449 or PTO/SB/08),
Paper No./Mail Date _____ | 7. <input checked="" type="checkbox"/> Examiner's Amendment/Comment |
| 4. <input type="checkbox"/> Examiner's Comment Regarding Requirement for Deposit
of Biological Material | 8. <input checked="" type="checkbox"/> Examiner's Statement of Reasons for Allowance |
| | 9. <input type="checkbox"/> Other _____ |

DETAILED ACTION

Examiner's Amendment

An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.

The application has been amended as follows:

Claim 9 has been amended to correct two typographical errors. On line 6, the word "leat" should read "least". On line 9, the word "grove" should read, "groove".

9. (Currently Amended) A method for making a spool comprising the steps of:

- (i) providing at least two trimable flange preforms, each containing a plurality of fiber grooves, each of said fiber grooves being characterized by a different bend radius R_i ;
- (ii) trimming said preforms to a desired size, thereby producing a flanges of desired diameter, while cutting at least one groove and maintaining at least one groove of said plurality of fiber grooves extending substantially to the outer edge of said flange, said groove being at an angle θ relative to the tangent line to the periphery of said flange so that said groove maintains desired bend radius of an optical fiber;
- (iii) providing a hub;
- (iv) assembling the hub and the flanges into the spool.

Examiner's Statement Of Reasons For Allowance

The following is an examiner's statement of reasons for allowance:

Art Unit: 2874

Claims 2-6 are allowed. Previously objected claim 2 has been rewritten in independent form to include all of the limitations of the base claim and any intervening claims and is now in conditions for allowance. Claims 3-6 are dependant on amended claim 2 and are therefore also allowable.

Claims 8 and 12 are allowed. Previously objected claims 8 and 12 have been rewritten in independent form to include all of the limitations of the base claim and any intervening claims and is now in conditions for allowance.

Claim 7 is allowed. The prior art of record fails to disclose or reasonably suggest a fiber spool comprising a hub sandwiched between two flanges, at least one of the flanges including at least one smoothly curving arcuate fiber groove on the side facing the hub, where the fiber groove extends substantially to the outer edge of the flange, the groove being at an angle θ relative to the tangent line to the periphery of said flange, there the fiber spool further contains a fiber, there the fiber groove reverses the fiber direction so that the fiber leads point in the same direction. A close prior art of record is previously cited U. S. Patent 6,522,826 to Gregory. Gregory discloses a similar fiber spool comprising a hub sandwiched between two flanges with a reversal tacked to the wound fibers for reversing the direction of the fiber. Gregory does not disclose or reasonably suggest a groove on the flange to reverse the direction of the fiber.

Claims 9 and 10 are allowed. The prior art of record fails to disclose or reasonably suggest a method of making a spool comprising the steps of providing at least two trimable flange preforms, each containing a plurality of fiber grooves, each of said fiber grooves being characterized by a different bend radius R_i , trimming said preforms to a desired size, thereby producing a flanges of desired diameter, while cutting at least one groove and maintaining at

Art Unit: 2874

least one groove of said plurality of fiber grooves extending substantially to the outer edge of said flange, said groove being at an angle θ relative to the tangent line to the periphery of said flange so that said groove maintains desired bend radius of an optical fiber, providing a hub and assembling the hub and the flanges into the spool. A close prior art of record is U.S. Patent 5,802,237 to Pulido relied upon in the rejection set forth in the previous Office action, mailed 14 February 2006, paper number 022006, and now withdrawn.

Therefore, claims 2-10 and 12 are allowed.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tina M. Wong whose telephone number is (571) 272-2352. The examiner can normally be reached on Monday-Friday 8:30-5:30.


If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Rodney Bovernick can be reached on (571) 272-2344. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2874

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



J. M. W.



SUNG PAK
PRIMARY EXAMINER